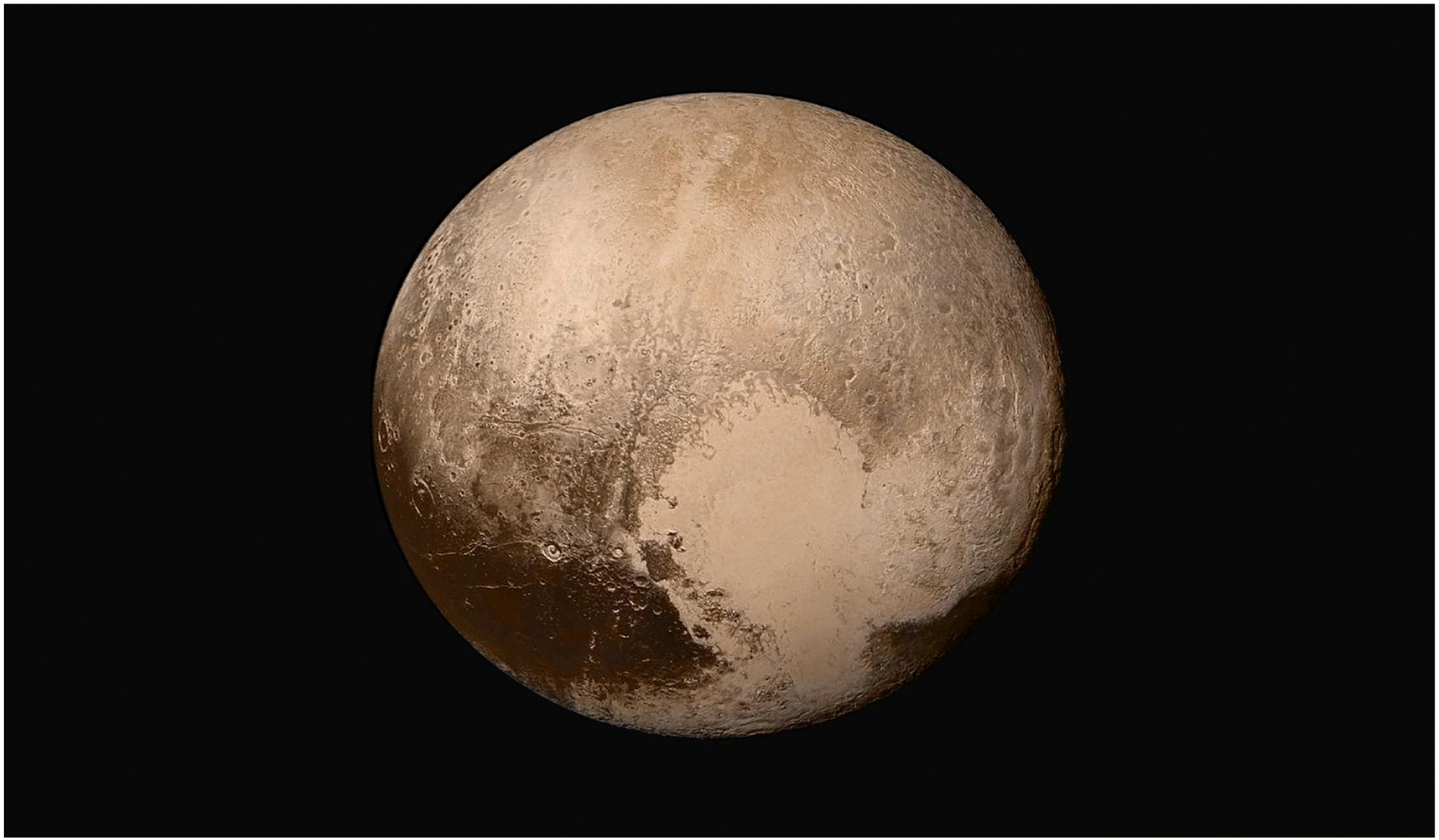
National Aeronautics and Space Administration

Pluto in True Color



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Four images from NASA's New Horizons' LOng Range Reconnaissance Imager (LORRI) were combined with color data from the Ralph Multispectral Visible Imaging Camera (MVIC) to create this global view of Pluto. The images, taken when the spacecraft was 280,000 miles (450,000 kilometers) away, show features as small as 1.4 miles (2.2 kilometers).

This view is dominated by the large, bright, heart-shaped feature informally named Tombaugh Regio, which measures approximately 1,000 miles (1,600 kilometers) across. The terrain surrounding Tombaugh Regio is complex, displaying chasms, craters, mountains, and other features. However, even at high resolution, much of Tombaugh Regio's interior is remarkably smooth and crater-free—evidence for ongoing geologic processes. Features within the boundaries of Tombaugh Regio may trace the flow of exotic ices in relatively recent geologic times.

Pluto's Breathtaking Farewell to New Horizons

This global portrait of Pluto's backlit atmosphere was captured when New Horizons was about 1.2 million miles (2 million kilometers) from the dwarf planet and shows structures as small as 6 miles (10 kilometers) across. The image is displayed with Pluto north oriented toward the top of the frame.

Roughly two days after closest approach, New Horizons aimed LORRI back at Pluto, capturing sunlight streaming through the atmosphere and revealing hazes as high as 80 miles (130 kilometers) above Pluto's surface. Backlit by the sun, which is out of frame to the upper right, Pluto's atmosphere shines around its silhouette like a luminous halo in this image taken by New Horizons on July 15, 2015, half an hour before midnight EDT.

A preliminary analysis of an image taken earlier of Pluto's haze shows it has several distinct layers—one about 50 miles (80 kilometers) above the surface and the other at an altitude of about 30 miles (50 kilometers).

The Johns Hopkins University Applied Physics Laboratory, Laurel, Maryland, manages the New Horizons mission for NASA's Science Mission Directorate in Washington, DC. At NASA Headquarters, John Grunsfeld is associate administrator for the Science Mission Directorate. James Green is director of NASA's Planetary Division. Alan Stern, of the Southwest Research Institute, is the principal investigator for New Horizons and leads the mission. SwRI leads the science team, payload operations and encounter science planning. APL designed, built and operates the New Horizons spacecraft. New Horizons is part of the New Frontiers Program, managed by NASA's Marshall Space Flight Center in Huntsville, Alabama.

Image Credits: NASA/Johns Hopkins University Applied Physics Laboratory/Southwest Research Institute

For images and information about NASA's New Horizons mission, visit:

http://www.nasa.gov/newhorizons
http://pluto.jhuapl.edu

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